

interim period while the Board conducts its proceeding. Sprint's proposal in this respect should not be adopted, so long as there are some effective safeguards to ensure parity.

PRTC has agreed to provide specific reports measuring how well it is performing with regard to certain functions relating to its service to Sprint, to follow its existing CLEC and resale carrier manuals, and to memorialize the determinations of the PRTC-Sprint Implementation Team in the existing PRTC CLEC and resale carrier manuals. I note that PRTC's reporting proposals do not appear to provide for information regarding PRTC's provision of services to itself. As Sprint has noted, it is not possible to determine whether PRTC is providing nondiscriminatory service to Sprint without data concerning PRTC's provision of service to itself. Accordingly, PRTC must provide Sprint with the reports it has already agreed to provide and with additional reports detailing PRTC's provision of service to itself under the same criteria.

The record also shows that the existing CLEC and Resale carrier manuals are inadequate. As Sprint has identified, Page 1-1 of both PRZ-1 and PRZ-2 state that these documents are for general information purposes only. They are not legally binding and do not obligate PRTC to provide any service services contained in the manual and in the manner prescribed in the manual. If there is a conflict between the manual and a PRTC tariff or contract, the tariff or contract prevails. PRTC reserves the right to revise the information in the manual. This, as admitted by Mr. Zielinski, means PRTC can, on a unilateral basis, change the manual without consultation or notice to any competing providers.⁵⁶

Moreover, the manuals are dated 1997. There is no information in the manuals if one wanted to contact a repair or provisioning department. There are no fax numbers. There are no organizational charts. There is no expedited process. There is no escalation process. There is no provisioning process. There is no repair process. There is no defined local calling area. There is no information about electronic interfaces. There is no information as to NXXs or applicable exchanges. There is no detailed directory information. There is no amendment process. There is no notification process.⁵⁷ In short, these manuals leave a lot to be desired.

Nevertheless, these manuals represent the best Puerto Rico specific performance standards and interconnection procedures currently available. They also apply to other carriers

⁵⁶ Cross-Examination of Zielinski at 83, 84.

⁵⁷ Direct Examination of Reed at 485-87.

pursuant to PRTC's other interconnection agreements and were developed with input from the industry as a whole.

On the other hand, PRTC and Sprint already have agreed to the formation of an Implementation Team to "develop and identify those processes, guidelines, specifications, standards and additional terms and conditions necessary to support the terms of this Agreement."⁵⁸ Through the Implementation Team, representatives of PRTC and Sprint will formulate processes, guidelines, specifications, standards and additional terms and conditions necessary to support the terms of this Agreement, which include the "monitoring of inter-company operational processes." The record reflects that Sprint is amenable to these terms. Mr. Reed confirmed that Sprint generally desires to see the development of performance standards such as those set forth in Sprint's proposed Article 9, but that Sprint does not contend that such standards should be applied immediately to PRTC.⁵⁹ Rather, according to Mr. Reed, realistic performance standards should be established in a collaborative process that is open to the industry:

PRTC hopefully will be dealing with a number of new entrants to the market, and to require PRTC to provide different measurements for everyone is not efficient for them and it doesn't guarantee equal treatment for PRTC or any of the entrants into the market.⁶⁰

As discussed by Mr. Reed at the hearing, Sprint has agreed that the determinations of the Implementation Team should be memorialized in the CLEC and Resale Manuals maintained by PRTC: "[T]he implementation team . . . was meant to be sure that all these issues, all these things that are needed to do business are addressed prior to entering the market and, yes, I think it would be a good idea to move them into the manual and that's what we've agreed to do."

Because the manuals will be updated to reflect the findings of the PRTC-Sprint Implementation Team, performance standards should improve for the industry as a whole pending the conclusion of the Board's proceeding. Accordingly, PRTC's language concerning

⁵⁸ Agreement § 2.8.

⁵⁹ See Deposition Transcript of Reed at 71; Cross-Examination of Reed at 508.

⁶⁰ Deposition Transcript of Reed at 51. See also Sprint's Opening Statement at 38 ("[W]hat Sprint believes should happen is that a procedural workshop should be held."); Cross-Examination of Reed at 509-10 ("The other suggestion Sprint has made is that the [B]oard may want to institute a collaborative session for the entire industry in Puerto Rico . . . to set standards that apply here."); *id.* at 511 ("I think everyone that wants to participate and has an interest, yes, should have a voice in that discussion.").

performance standards should be included in the Agreement pending the outcome of the Board's proceeding.

II. PRICING ISSUES

A. Forward Looking Models

There are five (5) disputed pricing issues in this proceeding. Three of these (Issue 19—transport and termination, Issue 24—unbundled loops, Issue 26—NID) involve PRTC's forward-looking model (FLM). Two issues (Issue 20—unbundled dedicated transport and Issue 23—signal transfer point port), do not involve a forward-looking model. In these cases, PRTC relies on its interstate tariff as proxy for developing its pricing proposal for these items. Since three of the five issues involve the FLM, I will begin with my findings related to the FLM that PRTC proposes and the alternative forward-looking model that Sprint proposes. This discussion will ultimately apply to Arbitration Issues No. 19, 24 and 26.

PRTC recommends the adoption of FLM version 5.0.⁶¹ Sprint, while using the FLM for portions of its analysis, recommends that alternative models be used to determine appropriate forward-looking economic costs for the disputed items. Specifically, Sprint recommends that the Benchmark Cost Proxy Model (BCPM) version 3.1 be used to develop loop direct investment.⁶² Sprint also recommends the use of its Levelizer model and a Loop UNE model used to develop final banded loop prices.

A threshold question regarding the FLM and alternative models is whether they are forward-looking economic cost models. In cross-examination, Mr. Blessing affirmed that the FLM conforms to the FCC rules pertaining to forward-looking economic cost models.⁶³ Sprint suggests otherwise. Sprint claims that PRTC has failed to "provide vital cost information to

⁶¹ Blessing's Direct Testimony at 30. There is also further analysis provided by PRTC that is identified in testimony as the "super-test" model, or FLM version 5.1. The super-test model contains twelve (12) modifications as identified by Mr. Blessing. Direct Examination of Blessing at 188. In post-hearing correspondence to Douglas Meredith, Mr. Blessing provides results for a thirteenth (13th) modification. For purposes of this analysis, I will refer to the most recent version available as "FLM." This means the FLM with thirteen (13) modifications.

⁶² Sprint's Post-hearing Br. at 40-46.

⁶³ 47 CFR §§ 51.501-515.

verify that the FLM complies with FCC requirements"⁶⁴ In particular, considerable attention has been devoted to examining the loop cost development in each model.⁶⁵

I conclude that the FLM is minimally an acceptable forward-looking economic cost model. An ideal forward-looking economic cost model would optimize the route selection of loops based upon actual customer locations or projected customer locations. However, as this result is currently unachievable in Puerto Rico, efforts by PRTC to use average loop lengths are satisfactory. Sprint's recommendation to use the BCPM is fraught with another set of inadequacies, not because of the modeling, but because of the poor data available for Puerto Rico.⁶⁶ The unavailability of reliable Puerto Rico data for the BCPM is such a severe impediment that the BCPM cannot be used to determine unbundled network element prices.⁶⁷ I find that, despite the inadequacies of poor data, the FLM satisfies forward-looking economic cost principles pertaining to the direct loop investment. The parties should note that, while the FLM is in minimal compliance with FLEC principles, when additional data becomes available, updates to the algorithm used by PRTC would be appropriate.⁶⁸

It should be noted that I adopt the PRTC FLM results for direct loop investment with serious reservations. I find particularly distressing the exclusive use of Lucent 2000 DLCs. These digital loop carriers are large capacity devices, capable of supporting nearly 700 access lines per cabinet.⁶⁹ PRTC claims that its forward-looking practices require that it use Lucent 2000 DLCs for all customer-serving areas. Yet, there are some customer-serving areas that have a projected demand of less than 30 customers. Using such high capacity equipment when alternative, lower capacity equipment is available in the industry and easily integrated remains a question that PRTC was unable to answer adequately.⁷⁰

Nevertheless, I believe that, on balance, reliance on a flawed model is better than reliance on a severely flawed model. The parties' proposals for per line forward looking switching

⁶⁴ Sprint's Post-hearing Br. at 37-38.

⁶⁵ Hearing Testimony of Rearden at 540 *et. seq.*; Hearing Testimony of Blessing at 158 *et. seq.*

⁶⁶ PRTC's Post-hearing Br. at 117-18.

⁶⁷ The Board has used BCPM with extreme reservations in a universal service proceeding before the FCC. See Letter from Puerto Rico Telecommunications Regulatory Board to FCC dated May 8, 1998.

⁶⁸ U.S. Bureau of the Census data should be available in 2002.

⁶⁹ Cross-Examination of Blessing at 357-58.

⁷⁰ *Id.* at 358.

investments are reported to be within \$10.00 of each other.⁷¹ Agreement between the parties on switching investment suggests that switching investment is less controversial than direct loop cost in this proceeding. Moreover, consistent treatment of costs across elements is a fundamental principle of economic modeling, which principle should receive deference in arbitration proceedings. Therefore, throughout this proceeding, I adopt a consistent approach rather than an *ad hoc* approach to cost. The submission of a complete model for switching and loop costs is consistent and is superior to adopting, piecemeal, one model for loops and another for switching. Accordingly, I adopt the FLM results for per line forward looking switching investment and find that these costs minimally satisfy the forward-looking criteria provided by the FCC.

Another controversial issue concerning pricing is the development of forward-looking annual cost factors (ACFs). ACFs are used to assign direct, shared and common expenses to forward-looking investments -- thereby creating an annual cost for pricing purposes. The FCC rules provide that FLEC models should as best as possible, directly assign costs to elements and spread common costs across all elements using reasonable methods. In the FLM, ACFs carry an extremely heavy burden. PRTC uses ACFs to account for all direct, shared and common cost expenses. Sprint has attacked the appropriate development of the PRTC ACFs and has opted to propose other ACFs to be used instead of the PRTC ACFs. To bring closure to the entire ACF issue, I will examine in detail some of the deficiencies of the proposed ACFs and require specific courses of action for some of these annual charge factors.

Sprint claims that PRTC has failed to account for a declining investment base for the life of the plant.⁷² I agree. PRTC has failed to account for depreciation reserves in its study. This failure leads to an overstatement of earnings because the FLM does not account for net investment and calculates return on gross investment. Consequently, the FLM overstates return on investment. I conclude that PRTC must modify its FLM to account for depreciation reserves. This modification can take several forms, and I will leave it to PRTC to integrate this modification into the FLM version containing the thirteen changes made by Mr. Blessing.

Until PRTC makes this modification, I will base my evaluation on an adjustment to the return factor. An adjusted return applied to total plant in service will be equivalent to the

⁷¹ Cross-Examination of Blessing at 177.

⁷² Sprint's Post-hearing Br. at 38.

proposed return percentage applied to net plant in service. This adjustment to the return factor is expressed as

$$\text{Adjusted return} = (1 - \text{depreciation rate}) * 0.1125.$$

The adjusted return used in this analysis is 10.46 percent for CWF, 10.37 percent for COE and 10.62 for Support Plant. (See Exhibit A for derivation of the adjusted return.)

Sprint also claims that PRTC has failed to account for the present value of money for costs after the first year.⁷³ I agree with Sprint that some accommodation must be made for the time value of money in a forward-looking model. Sprint suggests that the Levelizer model is the appropriate vehicle to carry this load. However, I have been unable to confirm the accuracy of the Levelizer model. Consequently, while I agree with Sprint in principle, I cannot agree with it in practice. Nevertheless, PRTC must account for the time value of money and its effect on ACFs. PRTC has presented testimony that, because contract life is much shorter than equipment life,⁷⁴ conventional time value of money calculations cause a price deficiency for the early portions of the contract life. However, PRTC's current approach fails to account for any value of time. Therefore, PRTC must recognize that there is value to telecommunications equipment after the contract life and that the time value of money should apply for the three (3) year contract life. This recognition can be made using a terminal value approach to a conventional depreciation study. Therefore, PRTC must modify its depreciation analysis and its development of ACFs to depreciate specific asset categories and recognize the net value of equipment after the term of the proposed contract has lapsed. In the alternative, PRTC must modify its depreciation expense factor according to the method described in Exhibit B. This modification accounts for a three-year contract life and recognizes undepreciated value of investment. The result^{*} of this refinement is that the depreciation expense factors are reduced by 18 percent.

PRTC relies on current relationships between investments and expenses to develop cost factors for maintenance expense, network support, network operations and corporate operations. PRTC suggests that its approach relies on verifiable data, and is straightforward.⁷⁵ Sprint claims that the PRTC method ignores a "forward-looking plant mix tending towards more state-of-the-

⁷³ *Id.*

⁷⁴ See Cross-Examination of Blessing at 444.

⁷⁵ PRTC's Post-hearing Br. at 78.

art equipment with lower maintenance costs”⁷⁶ In the alternative, Sprint has proposed using alternative factor developments.⁷⁷ PRTC vigorously criticizes Sprint’s alternatives arguing that Sprint has provided no justification for the development of its direct cost factor.⁷⁸ I agree with PRTC that, in certain respects, Sprint has failed to provide cost support for its cost factors. For instance, the 15 percent common cost allocation factor appears to have no justification other than that it has been used by Sprint in other jurisdictions.⁷⁹ Therefore, I do not accept Sprint’s annual charge factor alternatives. However, I understand that cost efficiencies should exist in a forward-looking network and that PRTC has failed to account for these efficiencies. Other regulatory authorities have addressed this issue by applying an efficiency factor to the historically developed ACFs.⁸⁰ Moreover, the Board has recognized the efficiency of a forward-looking network in its universal service filing with the FCC.⁸¹ Consequently, I adjust the ACFs for maintenance expense, network support, network operations and corporate operations to realize the forecasted efficiency of a forward-looking network. PRTC shall adjust downward the referenced annual cost factors by 10 percent, as shown in Exhibit C. This adjustment relies on the experience of other regulatory agencies and the use of an efficiency factor by the Puerto Rico Board in another proceeding.

The FLM version 5.0 with modifications has also been called the super test model. The super test identifies 13 changes that PRTC has incorporated into the FLM to analyze their effect on UNE prices. Sprint does not want the super test version of FLM admitted into the record unless a memorandum of Mr. Holmes is also allowed.⁸² On September 8, 1999 PRTC filed a Motion to Strike the Holmes memorandum with the exception of Items Three and Four, and subpart three of Item Five. I agree with PRTC that this memorandum is a vehicle to argue old

⁷⁶ Sprint’s Post-hearing Br. at 38-39.

⁷⁷ *Id.* at 39-40

⁷⁸ PRTC’s Post-hearing Br. at 85.

⁷⁹ Direct Examination of Holmes at 624, line 24, to 625, lines 1-7.

⁸⁰ For instance, the Michigan Public Service Commission has applied a 20 percent efficiency factor on expenses, including common costs, to forward-looking cost studies used for local rates. (*See generally* Case Nos. U-11831, U-11832, U-11448).

⁸¹ The Board applied an efficiency factor on all expense accounts of 10 percent. *See* Letter from Puerto Rico Telecommunications Regulatory Board to FCC dated May 8, 1998.

⁸² Sprint’s Post-hearing Br. at 68-69; *see also* Cross-Examination of Holmes at 803-04.

points and to raise new issues which Sprint had an adequate opportunity to raise these points at the hearing. This Motion is GRANTED.

Regarding Item Three, Mr. Holmes suggests that a double counting has occurred in making a super test change. However, in the memorandum from Mr. Blessing to Mr. Meredith on September 2, 1999, the sensitivity effect of this change causes the loop rate and the transport rate to decline. I would expect a double counting error to increase the cost of the network elements. Therefore, I cannot see that the double counting has occurred. As to Item Four, I agree with Sprint that the support plant factor has been slightly overstated, and consequently adopt the revised number. This changes the support plant factor to 11.11 percent from 11.77 percent. Subpart three of Item Five relates to the thirteenth change—including a 50 percent aerial cable structure sharing change. This information was included in the September 2, 1999 memorandum. This change to the structure sharing percentage appears reasonable and is therefore adopted.

In sum, neither the FLM nor the BCPM are ideally suited to use in this proceeding. However, on balance, the FLM is marginally superior and will form the basis of my decisions on pricing issues. Nevertheless, the following changes are or must be incorporated into the FLM version 5.0.

1. Adopt the thirteen (13) changes reported by Mr. Blessing in his letters to Mr. Meredith, dated August 25, 1999 and September 2, 1999.
2. Modify depreciation factors for CWF, COE and Support Plant to reflect a levelized annual factor for the three-year contract period.
3. Modify the return factors for CWF, COE and Support Plant to reflect the existence of depreciation reserves.
4. Modify the maintenance expense, network support & general support, network operations, and corporate operations factors by reducing them to account for efficiency. The factors are to be reduced by 10 percent.
5. Change the support plant factor from 11.77 percent to 11.11 percent.

B. ARBITRATION ISSUE NO. 19: Pricing of transport and termination/unbundled switched usage

Statement of the Issue. The parties disagree as to whether the transport and termination/unbundled switched usage rates derived pursuant to PRTC's cost study are appropriate. In particular, the parties disagree as to the Annual Cost Factor that would be applied to direct investment.

Sprint's Position. Sprint argues that PRTC has failed to provide Sprint with information essential to verify that its rates are indeed forward looking. Sprint also states its belief that PRTC's cost proposals are inflated.

PRTC's Position. PRTC maintains that Sprint has uncovered no valid basis to challenge PRTC's rate proposals. First, Sprint objects to PRTC's provision of a bid for switching as representative of the switch price, preferring instead an invoice. PRTC argues that this is an empty objection given that PRTC has provided the bid submitted by the winning vendor, which is identical to the invoice price. Second, Sprint objects to the use of a 1997 traffic study. However, PRTC revised its cost study using 1998 data, which resulted in a decrease in some rates.

Decision

The FLM version 5.0 should be adopted with modifications described above and for the reasons described above. The transport and termination rates adopted herein are listed in the following table. This table also identifies the rates proposed by PRTC and Sprint during this arbitration.

Transport and Termination Rates:

<u>Item</u>	<u>PRTC Proposed</u>	<u>Sprint Proposed</u>	<u>Decision</u>
Switched Transport Facility per minute mile	\$0.000145	\$0.000026	\$0.000083
Switched Transport Termination per minute	\$0.002274	\$0.000348	\$0.001959
Tandem Switching	\$0.00173	\$0.001121	\$0.001524
Local Switching	\$0.008332	\$0.005188	\$0.007132

C. ARBITRATION ISSUE NO. 20: Unbundled dedicated transport

Statement of the Issue. The parties disagree as to whether unbundled dedicated transport should be priced pursuant to the applicable portions of PRTC's FCC Tariff No. 1, Section 17.

Sprint's Position. Sprint argues that PRTC should be ordered to perform a TELRIC cost study so that the Board might establish permanent cost-based rates for unbundled dedicated transport. Sprint emphasizes that although the Board may adopt proxies pursuant to Section 51.513 of the FCC rules, it is not required to do so.

PRTC's Position. PRTC argues that use of PRTC's tariffed rates for unbundled dedicated transport is far more conducive to competition in the Puerto Rico telecommunications market than a TELRIC study-based rate.

Moreover, use of a lower rate will create an inappropriate arbitrage opportunity for Sprint and other CLECs entering the market in the future.

PRTC maintains that because the Board has discretion under the FCC Rules to establish a proxy-based rate for unbundled dedicated transport, and setting such a rate pursuant to PRTC's tariff would promote fair competition, the Board should adopt PRTC's proposal.

Decision

PRTC is correct in identifying the options available to the Board in using PRTC's interstate tariff. According to FCC Rule § 51.513(c)(3), the Board may adopt a proxy for forward-looking costs for unbundled dedicated transport, provided that proxy-based rate does not exceed the ILEC's tariffed rate for such offerings. In this proceeding, PRTC has failed to provide any FLM results for unbundled dedicated transport and as such has deprived the Board its opportunity to choose between PRTC FLM cost results and the tariff rate for unbundled transport. Sprint has provided optional pricing using the BCPM results. However, because the BCPM has already been determined to be plagued with data reliability problems, I cannot adopt BCPM results. Given that no information was provided by PRTC, PRTC must produce forward-looking costs for unbundled dedicated transport consistent with the FLM, with adjustments, within 90-days of this Order. Since common costs currently assigned in the existing FLM will now be spread across another network element that has forward-looking investment, I expect FLM-annual charge factor allocations for all currently reported elements to decrease slightly. The requirement to provide forward-looking modeling for all elements within a consistent framework is both prudent and necessary. It is prudent to require comprehensive modeling because it eliminates any inappropriate annual charge factors among network elements, and it is necessary in this instance because PRTC failed to provide any forward-looking cost data or unbundled dedicated transport.

In the interim, if Sprint elects to order unbundled dedicated transport before PRTC has developed FLM costs pursuant to this Order, PRTC will provide this network element based upon its FCC Tariff as described in the record.

D. ARBITRATION ISSUE NO. 23: Signal Transfer Point (STP) Port

Statement of the Issue. The parties disagree as to whether Signal Transfer Point (STP) port may be priced pursuant to the applicable portions of PRTC's FCC Tariff No. 1, Section 17.

Sprint's Position. Referring to its argument under Arbitration Issue No. 20, Sprint maintains that PRTC should be required to perform a TELRIC cost study so that the Board might establish permanent rates.

PRTC's Position. PRTC refers the Board to its discussion of tariff-based proxies under Arbitration Issue No. 20. Because the Board has discretion under the FCC Rules to establish a proxy-based rate for STP ports, and setting such a rate pursuant to PRTC's tariff would promote fair competition, the Board should adopt PRTC's proposal.

Decision

Citing my decision for Arbitration Issue No. 20 by reference, I require that PRTC provide FLM-based results for the STP port within 90-days of this Order. During the intervening period, if Sprint orders STP ports from PRTC, PRTC shall provide this network element based upon the FCC Tariff referenced in the record.

E. ARBITRATION ISSUE NO. 24: Unbundled loops

Statement of the Issue. The parties disagree as to whether unbundled loops may be priced pursuant to PRTC's cost study.

Sprint's Position. Referring to its argument under Arbitration Issue No. 19, Sprint maintains that PRTC has failed to provide information sufficient for Sprint to verify that PRTC's unbundled loop rates are forward-looking. Sprint also states its belief that PRTC's cost proposals are inflated.

PRTC Response. PRTC claims that it has provided extensive support for its unbundled loop rates. First, PRTC provided to Sprint the methodology by which it rendered PRTC's loop cost forward-looking over three-and-a-half months ago in connection with the interconnection negotiation. Second, PRTC has provided additional back-up information consisting of cable

investment data, and at Sprint's request, further back-up of those back-up data. At bottom, Sprint has everything it needs to verify PRTC's loop cost data.

With respect to Sprint's unspecified claim that PRTC's loop rates are inflated, PRTC incorporates by reference its response to Arbitration Issue No. 19.

Decision

I conclude that the cost development for loops should follow the FLM with the modifications as discussed above. In order to remain consistent while using the FLM, the banding of loops shall be according to density zone. While both the PRTC and Sprint methods are versions of geographic averaging, other than to remain consistent within the model, there is no compelling reason to adopt one method over the other. Ideally, the banding method would incorporate a contiguous area banding that would allow for geographic clustering. The selection by Sprint to sort the locations by cost and then identify bands from loop cost does not account for geography. The density zone band proposed by PRTC examines density per location, however, the PRTC method does not account for geography for contiguous clusters. While the parties generally agree that some type of banding should exist, the record is unclear as to the appropriate methodology for determining loop cost bands. Therefore, to remain consistent with one model and method, I conclude that the FLM method of banding is satisfactory.

Accordingly, the adopted unbundled loop costs are as follows:

II. Unbundled Loop Costs

Density Zone determined by the number of lines within x 1/2 route mile radius of CSA location

		Source	Density Zone Midpoints (a)	Lines (b)	Current CSA Count (c)
1	Density Zone 1				
A	Served From a DLC	(WP8.1.Ln 4, Col B)and(Output 6,p2.Ln 23)	\$62.49	0	\$0.00
B	Served From a Host or Remote	(WP8.1.Ln 5, Col B)and(Output 6,p2.Ln 22)	\$62.49	0	\$0.00
2	Density Zone 2				
A	Served From a DLC	(WP8.1.Ln 4, Col C)and(Output 6,p2.Ln 23)	\$31.33	0	\$0.00
B	Served From a Host or Remote	(WP8.1.Ln 5, Col C)and(Output 6,p2.Ln 22)	\$31.33	0	\$0.00
3	Density Zone 3				
A	Served From a DLC	(WP8.1.Ln 4, Col D)and(Output 6,p2.Ln 23)	\$40.27	18,673	\$40.55
B	Served From a Host or Remote	(WP8.1.Ln 5, Col D)and(Output 6,p2.Ln 22)	\$23.00	137,188	\$23.29
4	Density Zone 4 201- 650 lines				
A	Served From a DLC	(WP8.1.Ln 4, Col E)and(Output 6,p2.Ln 23)	\$35.83	35,055	\$38.33
B	Served From a Host or Remote	(WP8.1.Ln 5, Col E)and(Output 6,p2.Ln 22)	\$19.37	521,190	\$21.88
5	Density Zone 5				
A	Served From a DLC	(WP8.1.Ln 4, Col F)and(Output 6,p2.Ln 23)	\$26.70	4,377	\$28.54
B	Served From a Host or Remote	(WP8.1.Ln 5, Col F)and(Output 6,p2.Ln 22)	\$14.56	41,312	\$16.40
6	Density Zone 6				
A	Served From a DLC	(WP8.1.Ln 4, Col G)and(Output 6,p2.Ln 23)	\$26.41	5,104	\$27.43
B	Served From a Host or Remote	(WP8.1.Ln 5, Col G)and(Output 6,p2.Ln 22)	\$13.30	216,410	\$14.33
7	Density Zone 7				
A	Served From a DLC	(WP8.1.Ln 4, Col H)and(Output 6,p2.Ln 23)	\$29.81	5,949	\$30.83
B	Served From a Host or Remote	(WP8.1.Ln 5, Col H)and(Output 6,p2.Ln 22)	\$12.22	162,113	\$13.24
8	Density Zone 8				
A	Served From a DLC	(WP8.1.Ln 4, Col I)and(Output 6,p2.Ln 23)	\$37.20	1,779	\$38.19
B	Served From a Host or Remote	(WP8.1.Ln 5, Col I)and(Output 6,p2.Ln 22)	\$11.14	178,050	\$12.12
9	Density Zone 9				
A	Served From a DLC	(WP8.1.Ln 4, Col J)and(Output 6,p2.Ln 23)	\$10.05	0	\$0.00
B	Served From a Host or Remote	(WP8.1.Ln 5, Col J)and(Output 6,p2.Ln 22)	\$10.05	0	\$0.00
10	System Average				
A	Served From a DLC	(WP8.1.Ln 4, Col A)and(Output 6,p2.Ln 23)	\$36.66	70,937	\$36.66
B	Served From a Host or Remote	(WP8.1.Ln 5, Col A)and(Output 6,p2.Ln 22)	\$18.45	1,256,263	\$18.45
C	Weighted Average	$\frac{(Ln10a, Col B * Ln10a, Col C) + (Ln10b, Col B * Ln10b, Col C)}{(Ln10b, Col B + Ln10b, Col C)}$	\$19.42		\$19.42

F. ARBITRATION ISSUE NO. 26: Network Interface Devices

Statement of the Issue. The parties disagree as to whether network interface devices ("NIDs") may be priced pursuant to PRTC's cost study.

Sprint's Position. Referring to its argument under Arbitration Issue No. 19, Sprint maintains that PRTC has failed to provide information sufficient for Sprint to verify that PRTC's NID rates are forward-looking. Sprint also states its belief that PRTC's cost proposals are inflated.

PRTC's Position. PRTC maintains that, due to Sprint's inability to identify other NID types it may seek to use, PRTC developed a standard process that it would use in connection with NID pricing. Through the course of the discussions, PRTC has duly provided a description of this process to Sprint, which is consistent with the overall pricing methodology.

With respect to Sprint's unspecified claim that PRTC's NID rates are inflated, PRTC incorporates by reference its response to Arbitration Issue No. 19.

Decision

I have previously discussed the basis for reliance on the FLM, with modifications. The NID rate, based on that modified FLM, will be \$2.06 per month.


IMPLEMENTATION

Pursuant to Section 252(c) of the Communications Act, the Board shall provide a schedule for implementation of its determinations in an arbitration proceeding. Given the deadlines imposed in the Communications Act, which are designed to keep all parties focused on achieving interconnection, I believe it is reasonable to require the parties expeditiously to prepare and submit for the Board's approval a revised interconnection agreement. Consequently, the parties should file an interconnection agreement consistent with this Order within 15 days of the release of this Order.

CONCLUSION AND ORDER

Pursuant to the Board's Resolution and Order of July 1, 1999, delegating certain powers to the Administrative Law Judge acting as Arbitrator in this case, IT IS HEREBY ORDERED that the Petitions of Sprint Communications Company L.P. and Puerto Rico Telephone Company ARE GRANTED AND DENIED consistent with this Order and Sprint and PRTC SHALL FILE an interconnection agreement consistent with this Order within 15 days of this date.

Dated: September 28, 1999



Veronica M. Ahern
Arbitrator
TELECOMMUNICATIONS REGULATORY
BOARD OF PUERTO RICO

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Exhibit A
Intermediate Depreciation Reserve Adjustment

		WS-1 Amounts
Total Plant in Service		
CWF		\$ 1,608,016,000
COE		\$ 757,085,000
Support Plant		\$ 404,839,000
Depreciation Expense		
CWF		\$ 138,648,000
COE		\$ 72,751,000
Support Plant		\$ 28,096,000
Proposed Depreciation Factors		
CWF		8.62%
COE		9.61%
Support Plant		6.94%
Levelized Depreciation Factors (Exhibit B)		
CWF		6.99%
COE		7.79%
Support Plant		5.63%
Proposed Return Factors		
CWF		11.25%
COE		11.25%
Support Plant		11.25%
Adjusted Return Factors		
CWF	(1-levelized dep. factor)*.1125	10.46%
COE		10.37%
Support Plant		10.62%

Exhibit B

Exhibit B					
Development of Levelized Three-year Depreciation Factors					
Present Value Factor	11.25%				
			End Year 1	End Year 2	End Year 3
CWF					
Initial Investment	\$1,000,000				
Proposed Annual Depreciation Factor	8.62%				
Annual Depreciation			\$86,200	\$86,200	\$86,200
Present Value of Annual Depreciation			\$77,483	\$69,648	\$62,600
Net Present Value of Annual Depreciation		\$209,736			
Levelized Annual Factor for Depreciation NPV		6.99%			
COE					
Initial Investment	\$1,000,000				
Proposed Annual Depreciation Factor	9.61%				
Annual Depreciation			\$96,100	\$96,100	\$96,100
Present Value of Annual Depreciation			\$86,382	\$77,647	\$69,790
Net Present Value of Annual Depreciation		\$233,824			
Levelized Annual Factor for Depreciation NPV		7.79%			
Support Plant					
Initial Investment	\$1,000,000				
Proposed Annual Depreciation Factor	6.94%				
Annual Depreciation			\$69,400	\$69,400	\$69,400
Present Value of Annual Depreciation			\$62,382	\$56,074	\$50,400
Net Present Value of Annual Depreciation		\$168,859			
Levelized Annual Factor for Depreciation NPV		5.63%			

Exhibit C

Proposed Annual Cost Factors

1.	Maintenance Expense Factor	
a.	CWF	4.82%
b.	COE	4.73%
2.	Netw. Supp. & Gen. Supp. Factor	1.57%
3.	Network Operations Factor	2.04%
5.	Corporate Operations Factor	2.89%

Adjusted Annual Cost Factors Based on an Efficiency Factor of 10%

1.	Maintenance Expense Factor	
a.	CWF	4.34%
b.	COE	4.25%
2.	Netw. Supp. & Gen. Supp. Factor	1.42%
3.	Network Operations Factor	1.83%
5.	Corporate Operations Factor	2.60%